

August 18, 2016

#### VIA ECFS, EMAIL, AND FIRST CLASS MAIL

Boone County Office of Emergency Management 400 E Prospect Harrison, AR 72601 ATTN: Kent McCormick

Re: STELAR Feasibility Certification, Market Modification Pre-Filing Coordination Letter for Boone County, AR, MB Docket No. 15-71

To the Boone County Office of Emergency Management:

DISH Network L.L.C. ("DISH") is in receipt of your pre-filing coordination letter ("Letter"), pursuant to the procedures set forth in the Federal Communications Commission's ("FCC") rules governing market modifications for satellite carriers under the STELA Reauthorization Act of 2014 ("STELAR").<sup>2</sup>

The Letter, and subsequent email between the undersigned and Kent McCormick, requests information regarding carriage of the local broadcast stations from the Fayetteville, Arkansas market into Boone County, Arkansas.

The attached Feasibility Certification pursuant to 47 C.F.R § 76.59(e) reflects DISH's response to the Letter.

Please contact the undersigned if you have any questions.

<sup>&</sup>lt;sup>1</sup> Letter from the Kent McCormick, Boone County Office of Emergency Management to Alison Minea, DISH Network, June 27, 2016.

<sup>&</sup>lt;sup>2</sup> See Amendment to the Commission's Rules Concerning Market Modification, Implementation of Section 102 of the STELA Reauthorization Act of 2014, Report and Order, MB Docket No. 15-71, FCC 15-111, ¶ 47 (Sept. 2, 2015) ("Market Modification Order"). See also STELA Reauthorization Act of 2014 (STELAR), § 102, Pub. L. No. 113-200, 128 Stat. 2059, 2060-62 (2014) (codified at 47 U.S.C. § 338(1)).

Sincere	lv.
Sincere	Ly,

<u>/s/</u>

Alison Minea
Director and Senior Counsel, Regulatory
Affairs
DISH Network L.L.C.

cc: Kent McCormick, booneoem@gmail.com

Attachment: Feasibility Certification Pursuant to 47 C.F.R. § 76.59(e)

## FEASIBILITY CERTIFICATION PURSUANT TO 47 C.F.R § 76.59(e)

- 1. This certification is issued by DISH Network L.L.C. ("DISH") pursuant to the pre-filing coordination procedures contained in the Federal Communications Commission's ("FCC") Order<sup>1</sup> governing market modifications for satellite carriers under the STELA Reauthorization Act of 2014 ("STELAR").<sup>2</sup>
- 2. This certification responds to the letter ("Letter") from the Boone County Office of Emergency Management requesting information carriage of the local broadcast stations from the Fayetteville, Arkansas market (the "Stations") to DISH subscribers in Boone County, Arkansas (the "County").
- 3. DISH has evaluated the Letter in light of its current satellites and spot beam configurations, and has determined that, at this time, DISH is unaware of any factors that render carriage of the Stations into the County "technically infeasible" pursuant to 47 C.F.R. § 76.59(e), provided that such carriage would be in standard definition (SD) format only. DISH reserves the right to amend this Feasibility Certification at any time due to, among other things, a satellite equipment failure or a different satellite being brought into service for the area that includes the County which has different coverage capabilities than the satellite(s) currently being used.
- 4. It would be "technically infeasible" pursuant to 47 C.F.R. § 76.59(e) to provide high definition (HD) Fayetteville local broadcast stations into Boone County due to lack of spot beam coverage from the satellite that transmits those signals. In determining whether spot beam coverage for the relevant satellite into the County, DISH evaluates whether the spot beam's signal, as designed by the satellite manufacturer, is predicted to achieve reception and demodulation of the signals at the same availability levels that DISH ordinarily uses to assess spot beam coverage for the local markets to which DISH provides service. In so doing, DISH has "conducted this analysis in substantially the same manner and using substantially the same parameters used to determine the geographic area in which it currently offers stations carried on the spot beam." The calculation methodology takes into account the following principal parameters: (i) the uplink and downlink portions of the end-to-end satellite signal, (ii) rain loss using the International Telecommunication Union ("ITU") 618.6 rain rate data and ITU rain region boundaries, (iii) atmospheric loss, (iv) carrier to interference ratio ("C/I") terms due to adjacent satellite interference, (v) C/I terms due to aggregate adjacent beam interference, (vi) cross polarization degradation, (vii) forward error correction, and (viii) modulation.

<sup>&</sup>lt;sup>1</sup> Amendment to the Commission's Rules Concerning Market Modification, Implementation of Section 102 of the STELA Reauthorization Act of 2014, Report and Order, MB Docket No. 15-71, FCC 15-111, ¶ 47 (Sept. 2, 2015).

<sup>&</sup>lt;sup>2</sup> STELA Reauthorization Act of 2014 (STELAR), § 102, Pub. L. No. 113-200, 128 Stat. 2059, 2060-62 (2014) (codified at 47 U.S.C. § 338(l)).

- 5. To the extent that a Fayetteville, Arkansas local broadcast station impacted by a market modification elects retransmission consent with respect to DISH for carriage of its station in the County, DISH cannot be certain whether it will be able to successfully reach an agreement with the station. If DISH is unable to reach a retransmission consent agreement with a given station, it will be impossible for DISH to provide that station's signal into the County. If any one of the Stations were to deny DISH the right to retransmit its signal into the County, it may be either technically or economically infeasible,<sup>3</sup> or both, for DISH to launch a customer offering with only the remaining stations that did grant retransmission consent.
- 6. As DISH noted in its comments during the development of the market modification rules, an FCC grant of a market modification could result in, among other things, two different stations affiliated with the same broadcast network being authorized for satellite local-into-local carriage in the County. This could result in DISH being required to pay retransmission consent fees twice for the same broadcast network. Therefore, we must reserve the right to charge additional fees to subscribers in the County who elect to receive any Fayetteville, Arkansas local broadcast stations that DISH may be authorized to offer as a result of any market modification.
- 7. Without the ability to offset the additional costs associated with a market modification, it would be "economically infeasible" pursuant to 47 C.F.R. § 76.59(e) for DISH to comply with a market modification ordered by the FCC consistent with the request described in the Letter.

The foregoing has been prepared using facts of which I have personal knowledge or upon information provided to me. I certify under penalty of perjury that the foregoing is true and correct to the best of my current knowledge, information, and belief.

Alison Minea

Director & Senior Counsel,

Regulatory Affairs
DISH Network L.L.C.

Executed on August 18, 2016.

<sup>&</sup>lt;sup>3</sup> See 47 C.F.R. § 76.59(e).

<sup>&</sup>lt;sup>4</sup> Comments of DISH Network L.L.C. at 9, MB Docket No. 15-71 (May 13, 2015).



November 21, 2016

Via E-mail and US Mail

Kent McCormick Director OEM, Boone County 400 East Prospect Harrison, AR 72601 booneoem@gmail.com

Dear Mr. McCormick:

Please find attached the results of your request for a preliminary evaluation of a potential market modification for **Boone County**, **AR**.

DIRECTV's engineering staff was given the areas to evaluate for **station KNWA** on our **Fort Smith, AR** spot beam, and have found that:

• DIRECTV's HD spot beam covers all current zip codes in Boone County

Please see attached for specific spot beam zip code coverage information. DIRECTV will forward the results of this preliminary evaluation to the FCC for their records.

Thank you for your letter and your interest in DIRECTV programming.

Sincerely,

DIRECTV

# Form of Certification Regarding Spot Beam Coverage

1.	My name is	Phil Goswitz	. I am	SVP of Engineering	g at DIRECTV. A	45
					carried on DIRECTV's spot beams.	

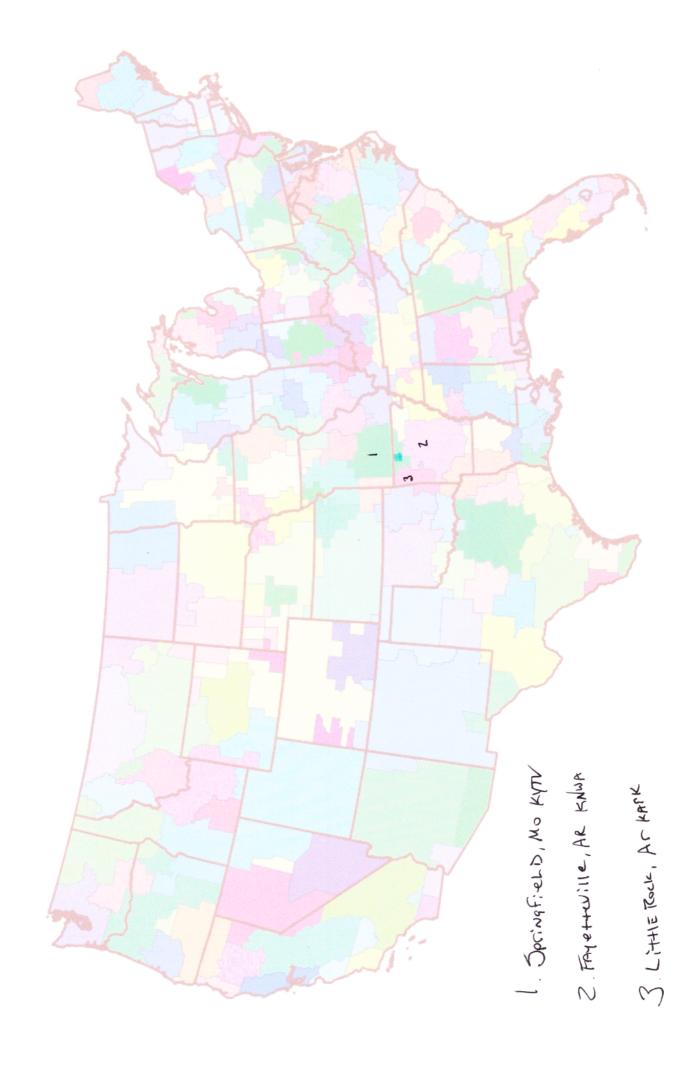
2. DIRECTV has reviewed the request to add the communities listed below to the local television market for the station indicated.

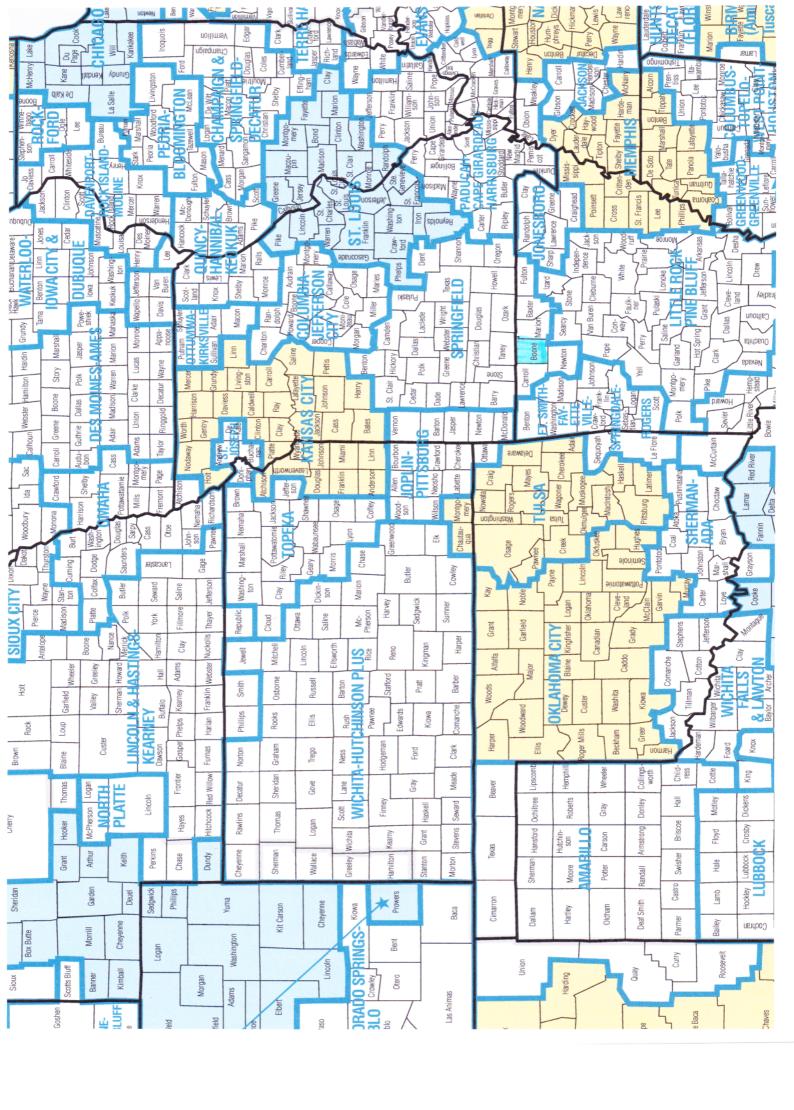
Station	State	County
KNWA	AR	BOONE

- 3. DIRECTV has analyzed, with respect to each zip code associated with this request, the expected performance against specific performance criteria. The following factors have been included in this analysis:
  - a. The measured performance of the spot beam covering this Television Station's local market.
  - b. Estimated atmospheric effects for reception of the signal.
  - c. Estimated levels of interference.
  - d. The amount of capacity currently used, and reasonably expected to be used, on the spot beam.
  - e. The target availability figure used for all television stations offered on the spot beam.
- 4. From this analysis, DIRECTV has derived the following metrics, which it has used to evaluate the potential to provide service in the zip code(s) in question:
  - a. Signal availability.
  - b. Clear sky signal margin.
  - c. Total carrier-to-interference ratio.
- 5. DIRECTV has conducted this analysis in substantially the same manner and using substantially the same parameters used to determine the geographic area in which it currently offers stations carried on the spot beam.
- 6. Based on this analysis, DIRECTV:
  - ☑ Can provide service to all the zip codes associated with this request.
  - ☐ Cannot provide service to any of the zip codes associated with this request because reception of the signal does not meet the minimum performance thresholds for DIRECTV's service.
  - ☐ Cannot provide service to some of the zip codes associated with this request because reception of the signal does not meet the minimum performance thresholds for DIRECTV's service. The list of unserved zip codes is attached.

I declare under penalty of perjury that the foregoing is true and correct.

Executed on





Military & Government

Commercial & OEM

Satellite 8. Content Services

Support

#### **Satellite Coverage Maps**

#### TracVision Maps

Africa Asia-Pacific Europe & Middle East Latin & South America

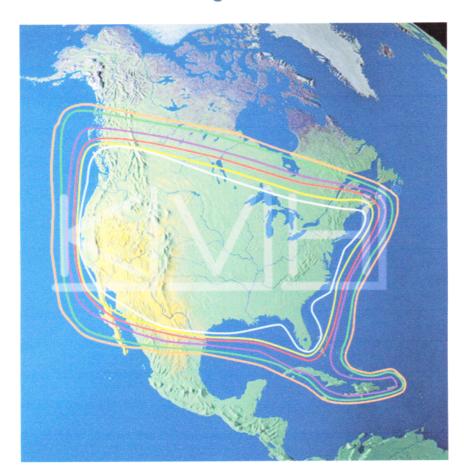
#### North America

Tri-Americas

TracPhone Maps

<u>HOME</u> > <u>Satellite Coverage Maps</u> > <u>TracVision Maps</u> > <u>North America</u> > <u>United States Coverage: DISH Network</u>

# **United States Coverage: DISH Network**



# Learn More DIRECTV® & DISH Network® Service Comparison

DOWNLOAD PDF

E-mail this page Print this page

Share

#### **Marine Products**

Key	Antenna Size	Products	Minimum EIRP
	1 m (41.5")	TracVision HD11	42 dBW
	81 cm (32")	TracVision TV8 and all other 81 cm (32") KVH antennas	43-44 dBW
	60 cm (24")	TracVision TV6 and all other 60 cm (24") KVH antennas, excluding the TracVision HD7	46-47 dBW
	45 cm (18")	TracVision TV5 and all other 45 cm (18") KVH antennas	48-49 dBW
	37 cm (14.5")	TracVision TV3 and all other 37 cm (14.5") KVH antennas	50 dBW
	32 cm (12.5")	TracVision TV1* and all other 32 cm (12.5") KVH antennas	51 dBW

<sup>\*</sup>TV1 coverage for Dish Network is limited to "Dish 500" (satellites 110W and 119W), "Dish Eastern Arc – Legacy" (satellites 61W, 110W, 119W) and the "Dish Western Arc" (satellites 110W, 119W, and 129W). Note that 129W coverage is not available in the northeast US due to the low elevation angle to the satellite. TV1 is not compatible with the "Dish Eastern Arc" (satellites 61W, 72W, 77W) at this time.

The coverage maps for these satellites are provided as reference only and may change in the future

or could be impacted by weather conditions. KVH provides no guarantees of satellite coverage, satellite availability, programming available on any specific satellite service, or compatibility of the TracVision system with new satellites that may be launched in the future. Please note that all Minimum EIRP values are average approximate figures that may vary according to actual transponder frequency and location.

#### **DISH Network Satellite Group Selector Guide**

#### TracVision TV1 & RV1 - Recommended Satellite Group by Location\*



### Key Description

- Western Arc Satellites: 110, 119, 129
  Use the Western Arc if you are in this region. Local channels will be available while traveling within your local service area.
- Legacy Eastern Arc Satellites: 110, 119, 61.5
  Use the Legacy Eastern Arc if you are in this region. Local channels will be available while traveling within your local service area.
- Western/Legacy Eastern Arc Overlap Satellites: 110, 119, 129

  Use the Western Arc in this region to receive most HD channels. However, most local channels will not be available. Use the Legacy Eastern Arc (110, 119, 61.5) in this region if you are traveling within your local service area and wish to receive local channels. However, some HD channels may not be available in this arc.

TracVision TV3, TV5, TV6 - Recommended Satellite Group by Location\*



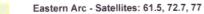
#### Key

#### Description



Western Arc - Satellites: 110, 119, 129

Use the Western Arc if you are in this region. Local channels will be available while traveling within your local service area.



Use the Eastern Arc if you are in this region. Local channels will be available while traveling within your local service area.

Local channel service is unavailable when you are not within the local service area associated with your billing address.

\*This map does not represent coverage areas for specific products, it is meant to provide information regarding the recommended satellite constellation to select for specific regions.

















KVH MEDIA GROUP

#### ONLINE COMMUNITY

Linkedin

Facebook

Twitter YouTube

Instagram KVH Blog

#### LEISURE

Marine Systems

RV Systems

Auto Systems

Satellite & Content

Services For Leisure

#### MILITARY & GOVERNMENT

Fiber Optic Gyros,

Inertial Navigation Systems & Compass

Sensors

Land Systems

Maritime Systems Satellite & Content

Services For Military &

Government

#### COMMERCIAL & OEM

Maritime Systems

Gyroscopes, Inertial Navigation Systems &

Compass Sensors

Land Systems

Satellite & Content Services For Commercial

& OEM

#### SATELLITE & CONTENT SERVICES

Content Delivery

Satellite Communications

Service

Network Management

Services

Satellite TV Services Satellite Services

Support

PARTNER PORTA

WHERE TO BU'

Search..

Leisure

Military & Government

Commercial & OEM

Satellite & Content Services

Support

#### Satellite Coverage Maps

#### TracVision Maps

Africa Asia-Pacific Europe & Middle East Latin & South America

North America

Tri-Americas

TracPhone Maps

**United States Coverage: DIRECTV** 

HOME > Satellite Coverage Maps > TracVision Maps > North America >

#### Ka- and Ku-band Services - TracVision HD7 and HD11



Learn More
DIRECTV®
& DISH Network®
Service Comparison

DOWNLOAD PDF >

E-mail this page Print this page

Share

Key	Antenna Size	Products	Minimum EIRP
	1 m (41.5")	TracVision HD11- Ka-band Coverage	45 dBW
	1 m (41.5")	TracVision HD11 - Ku-band Coverage	42 dBW
	60 cm (24")	TracVision HD7 - Ka-band Coverage	47 dBW
	60 cm (24")	TracVision HD7 - Ku-band Coverage	46 dBW

**Ku-band Services Only** 



Key	Antenna Size	Products	Minimum EIRP
	1 m (41.5")	TracVision HD11	42 dBW
	81 cm (32")	TracVision TV8 and all other 81 cm (32") KVH antennas	43-44 dBW
	60 cm (24")	TracVision TV6 and all other 60 cm (24") KVH antennas	46-47 dBW
	45 cm (18")	TracVision TV5 and all other 45 cm (18") KVH antennas	48-49 dBW
	37 cm (14.5")	TracVision TV3 and all other 37 cm (14.5") KVH antennas	50 dBW
	32 cm (12.5")	TracVision TV1 and all other 32 cm (12.5") KVH antennas	51 dBW

The coverage maps for these satellites are provided as reference only and may change in the future or could be impacted by weather conditions. KVH provides no guarantees of satellite coverage, satellite availability, programming available on any specific satellite service, or compatibility of the TracVision system with new satellites that may be launched in the future. Please note that all Minimum EIRP values are average approximate figures that may vary according to actual transponder frequency and location.





















## ONLINE COMMUNITY

Linkedin Facebook Twitter YouTube Instagram KVH Blog

#### LEISURE

Marine Systems RV Systems Auto Systems Satellite & Content Services For Leisure

#### MILITARY & GOVERNMENT

Fiber Optic Gyros, Inertial Navigation Systems & Compass Sensors Land Systems

Maritime Systems

#### COMMERCIAL & OEM

Maritime Systems Gyroscopes, Inertial Navigation Systems & Compass Sensors Land Systems

Satellite & Content Services For Commercial

#### SATELLITE & CONTENT SERVICES

Content Delivery Satellite Communications Service Network Management

Services

Satellite TV Services